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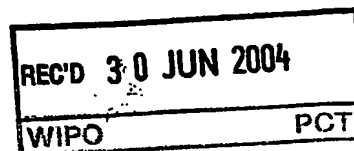


# Certificate

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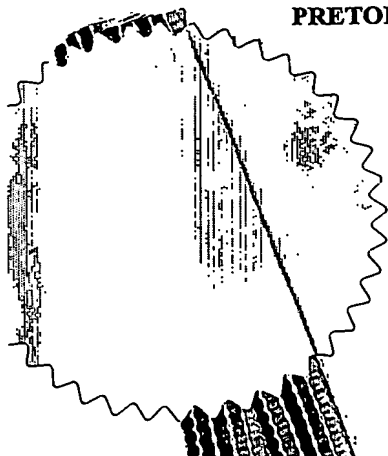
Application forms P.1, P.2, and provisional specification and drawings  
of South African Patent Application No.2003/4426 as originally filed in the  
Republic of South Africa on 06 June 2003 in the names of DIRK JACOBUS  
VAN DER MERWE; DR CORNELIUS MEYER DE VILLIERS for an invention  
entitled: "METHOD OF ACQUIRING DATA."

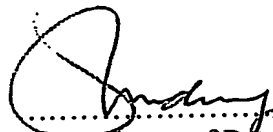
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18<sup>th</sup> dag van  
June 2004  
day of



  
Registrar of Patents

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**REPUBLIC OF SOUTH AFRICA  
PATENTS ACT, 1978**

**PATENT APPLICATION AND ACKNOWLEDGEMENT**

[Section 30(1) - Regulation 22]

The grant of a patent is hereby requested by the undermentioned applicant on the basis of the present application filed in duplicate.

21	01	Official Application No.: <b>2003/4426</b>	DrG Ref.: 620014
71	Full name(s) and address(es) of applicant(s):  Dirk Jacobus VAN DER MERWE 19 van der Merwe Crescent Welgemoed 7530  Dr Cornelius Meyer DE VILLIERS 1 Harfield Place Claremont 7700		<div style="border: 1px solid black; padding: 5px; text-align: center;"> <b>FAXED</b>  <b>06 JUN 2003</b> </div> <div style="border: 1px solid black; padding: 5px; text-align: center;"> <b>REGISTRAR OF PATENTS-DESIGN-TRADE MARKS AND COPYRIGHT</b>  <b>2003-06-06</b>  <b>REGISTRAR OF PATENTS-DESIGN-TRADE MARKS AND COPYRIGHT</b>  <b>2003-06-06</b>  <b>REGISTRATEUR VAN PATENTE-MODELLE-HANDELSMERKE EN OuteursRECHT</b> </div>
54	Title of invention: METHOD OF ACQUIRING DATA		
The applicant claims priority as set out on the accompanying form P2. The earliest priority claimed is:			
This application is for a patent of addition to Patent Application No.			21 01
This application is a fresh application (section 37) based on Application No.			21 01

**THIS APPLICATION IS ACCOMPANIED BY THE FOLLOWING:**

- |                                     |     |   |                  |          |
|-------------------------------------|-----|---|------------------|----------|
| <input checked="" type="checkbox"/> | 1.  | P6 Provisional specification                          | Pages: <u>9</u>  |          |
| <input type="checkbox"/>            |     | P7 Complete specification                             | Pages:           | 2 copies |
| <input checked="" type="checkbox"/> | 2.  | Drawings  | Sheets: <u>1</u> |          |
| <input type="checkbox"/>            | 3.  | P8 Publication particulars and abstract in duplicate. |                  |          |
| <input type="checkbox"/>            | 4.  | Drawing for abstract                                  |                  |          |
| <input type="checkbox"/>            | 5.  | An assignment of invention                            |                  |          |
| <input type="checkbox"/>            | 6.  | Certified priority document(s)                        |                  |          |
|                                     |     |   |                  |          |
| <input type="checkbox"/>            | 7.  | Copy of Form P2 and SA Patent Application No          |                  |          |
| <input type="checkbox"/>            | 8.  | Translation of the priority document(s)               |                  |          |
| <input type="checkbox"/>            | 9.  | An assignment of priority rights                      |                  |          |
| <input type="checkbox"/>            | 10. | P3 Declaration and power of attorney on form P3       |                  |          |
| <input type="checkbox"/>            | 11. | P4 Request for ante-dating on form P4                 |                  |          |
| <input checked="" type="checkbox"/> | 12. | P2 Register sheet (in duplicate)                      |                  |          |

Date: 06 June 2003

**Otto Gerntholtz**  
Patent Attorney

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PATENT ATTORNEYS OF APPLICANT(S)

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74	<p align="center"><b>ADDRESS FOR SERVICE:</b>  <b>DR GERNTHOLTZ INC</b>          PATENT AND TRADE MARK ATTORNEYS          P O BOX 8 CAPE TOWN 8000 SOUTH AFRICA          30 UNION ROAD MILNERTON 7441          TELEPHONE: +27 21 551 2650          TELEFAX: +27 21 551 2960</p>	
<div style="border: 1px solid black; padding: 5px;"> <b>REGISTRAR OF PATENTS-DESIGN-TRADE MARKS AND COPYRIGHT</b>  <b>2003-06-06</b>  <b>REGISTRATEUR VAN PATENTE-MODELLE-HANDELSMERKE EN OuteursRECHT</b> </div>		

REPUBLIC OF SOUTH AFRICA		REGISTER OF PATENTS		PATENTS ACT, 1978	
Official Application No.:		Lodging date: Provisional		Acceptance date:	
21	01 2003/4426	22	2003-06-06	47	
International Classification:		Lodging date: Complete		Grant date:	
51		22			
Full name(s) of applicant(s)/Patentee(s):					
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Applicants substituted				Date registered	
71					
Assignee(s):				Date registered	
71					
Full name(s) of inventor(s)					
72	Dirk Jacobus VAN DER MERWE Dr Cornelius Meyer DE VILLIERS				
Priority claimed		33	Country	31	Number
				32	Date
Title of invention					
54	METHOD OF ACQUIRING DATA				
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Patent of addition No.		74	Date of any change		
Fresh application based on		Date of any change			

**REPUBLIC OF SOUTH AFRICA**  
**PATENTS ACT, 1978**  
**PROVISIONAL SPECIFICATION**

[Section 30(1) - Regulation 27]

21	01	Official Application No.: 2003/4426	<b>DrG Ref.: 620014</b>
22	Lodging date: 06 June 2003		
71	Full name(s) of applicant(s): Dirk Jacobus VAN DER MERWE Dr Cornelius Meyer DE VILLIERS		
72	Full name(s) of inventor(s) Dirk Jacobus VAN DER MERWE Dr Cornelius Meyer DE VILLIERS		
54	Title of invention METHOD OF ACQUIRING DATA		

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DrG REF: 620014

## **TITLE OF INVENTION**

Method of acquiring data.

## **FIELD OF INVENTION**

5 The present invention relates to a method of acquiring data.

More particularly, the present invention relates to a method of acquiring data by means of numerical conversions.

## **BACKGROUND TO INVENTION**

When medical doctors examine patients, they normally do so by following a  
10 routine which they have developed through experience. The routines of various doctors thus vary depending on which area of medicine they have specialized in and what type of experience they have gained.

After each examination of a patient, a doctor should write a report on his findings and diagnosis of the patient. This enables the doctor to record a  
15 history of the medical problems of a patient. If the patient should change to a second doctor, or if the patient is referred to a second doctor for specialist treatment, then it is preferable that the second doctor knows the medical history of the patient.

Currently there is no mechanism by which a patient's medical history can be  
20 reliably stored or transferred to a second doctor. Thus every doctor expends a certain amount of time re-diagnosing the patient, before treating the patient.

This is time wasting and may result in an incorrect diagnosis of a patients medical condition.

It is an object of the invention to suggest a method of acquiring data, which will assist in overcoming these problems.

## 5 SUMMARY OF INVENTION

According to the invention, a method of acquiring data includes the steps of

- a) providing a first record set including a first unique number associated with a first person; a second unique number associated with a second person; a third unique number associated with a specific question,  
10 contained in a list of questions; and a fourth number being an answer to the specific question;
- b) providing a second record set associated with the first record set, the second record set including a question code associated with the third  
15 unique number; and a statistical weight to be given to the fourth number;
- c) providing a third record set associated with the second record set, the third record set including a description reference of the question code;  
and
- d) saving the first record set, the second record set, and the third record set  
20 in a database.

The first record set, the second record set, and the third record set may be transmitted to wherever required.

The first person may be a medical practitioner.

The first number may be associated with the medical practitioner's national registration number.

The first number may be associated with the medical practitioner's specialist  
5 qualifications and experience.

The second number may include a check digit calculated by means of the Lunz method.

The second person may be a medical patient.

The fourth number may be adapted to indicate a true or false answer to a  
10 question associated with the third number.

The first record set may include a fifth number associated with a date and time that the first person examined the second person.

The first record set may include a sixth number adapted to be a check digit for verifying the validity of any other number contained in the first record set.

15 The second record set may include a list of second unique numbers of further questions which must be answered.

The second record set may include a list of second unique numbers of further questions which need not be answered.

The third record set may include a reference to a publication containing a  
20 description of the question code.

## BRIEF DESCRIPTION OF DRAWINGS

The invention will now be described by way of example with reference to the accompanying schematic drawings.

In the drawings there is shown in:

- 5 Figure 1 a first record set provided by the method in accordance with the invention;
- Figure 2 a second record set provided by the method in accordance with the invention; and
- Figure 3 a third record set provided by the method in accordance with the  
10 invention.

## DETAILED DESCRIPTION OF DRAWINGS

The method of the first record set, the second record set, and the third record set data in accordance with the invention requires a person, such as a medical doctor, to make a hypothesis as to a possible medical diagnosis regarding a  
15 patient. The doctor is required to answer a select group of questions relating to that diagnosis. In order to answer the questions, the doctor may have to conduct simple tests on the patient.

The questions are asked in a structured format each question requiring a true or false answer. The number and type of questions which are asked may be  
20 increased or reduced depending on the answers given by the doctor to a specific question. The questions may even lead to the doctor making a new or second hypothesis as to the possible medical diagnosis.



As each new hypothesis is made, they are placed in a queue for processing after the current hypothesis has been fully processed.

The information obtained from using the method are stored in a database in a specific format (as will be described hereafter) and any other doctor, such as a specialist doctor, will be able to follow the first doctors medical analysis by studying this information. The medical history of the patient will be contained in this information and will thus be known to a specialist doctor.

The information relating to a hypothesis is stored in the database as various record sets as is shown in Figures 1 to 3 of the drawings.

Referring to Figure 1, a first record set, generally indicated by reference numeral 10, is shown. The first record set 10 includes a first or doctor identification number 12, a second or patient identification number 14, a date and time 16, a third or question number 18 and a fourth or answer number 20 given to the question number 18.

The first record set 10 can also include a check digit 22, which determines whether all the other numbers 12,14,16,18,20 contained in the record set 10 are correctly represented or if a problem has developed due to loss of characters or human error in copying the numbers 12,14,16,18,20.

The doctor identification number 12 is used to identify which doctor used the method in testing a hypothesis. Each doctor registered to practice in a country, in which the method is to be used, is allocated an individual identification number 12 which is identical to or can be derived from their national registration number. The doctor identification number 12 is further used to indicate whether or not the doctor has any specialist qualifications. This allows

control of the quality and responsibility of the doctor and also which referrals should be made to other doctors.

The patient identification number 14 is a unique number given to each patient who is analysed by the method. The last digit in the number is a check digit, which is calculated by the Lunz method, and enables the patient identification number 14 to be verified.

The date and time 16 is entered automatically, the time 16.1 being entered in twenty-four hour time format and the date 16.2 being entered in short date format.

10 The question number 18 is a unique number given to each possible question asked in the method. The question number 18 is never re-used, even if a question is deleted or redefined. The question number 18 is related to a second record set 24, which stores all the questions together with rule base information associated with the questions, as shown in Figure 2.

15 The second record set 24 relates the question identification number 18 with a code description 26 of the question, any further question associated with a question identification number 18.1 that should also be asked of the doctor, any question associated with a question identification number 18.2 that need not be asked of the doctor, as well as a statistical weight 28, which should be  
20 applied to the answer of the question associated with a question identification number 18.

If necessary, the code description 26 can be related to a third record set 30, as shown in Figure 3, which either provides a description 32 of the question asked, or can be linked to publication details of a publication giving a  
25 description of the question asked. The publication can be a printed publication

or it can be a publication provided on the internet. The publication will preferably contain details of the origin and reason for asking the question associated with a question identification number 18.

The answer number 20 can be associated with a true (1) or false (0) answer, or  
 5 it can be a number indicating a level of severity, e.g. of damage sustained during burn wounds.

The use of the first record set 10 enables a hypothesis to be made and stored in a secure manner, which contains detailed information in a structured format that can be easily researched. As the information is defined by numerical  
 10 characters, it is also easily transferable to other medical practitioners.

This method is thus also applicable for simultaneous real-time analysis of the information by many medical practitioners. As such the method is extremely viable for use in highly specialised operations, which require practitioners that are situated in different countries.

15 The method described above can also be used as a learning tool or as a grading tool whereby experienced doctors can judge the knowledge of inexperienced doctors. This is done by determining how many hypothesis were made and comparing these to the final diagnosis made of the patient. As the inexperienced doctor gains experience, the number of hypothesis made will or  
 20 should decrease before a correct final decision is made.

Date: 04 June 2003

  
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DrG Ref.: 620014

10 620014

2003/4426

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NO. OF SHEETS: 1  
SHEET NO.: 1  
DrG Ref.: 620014

FIG. 1

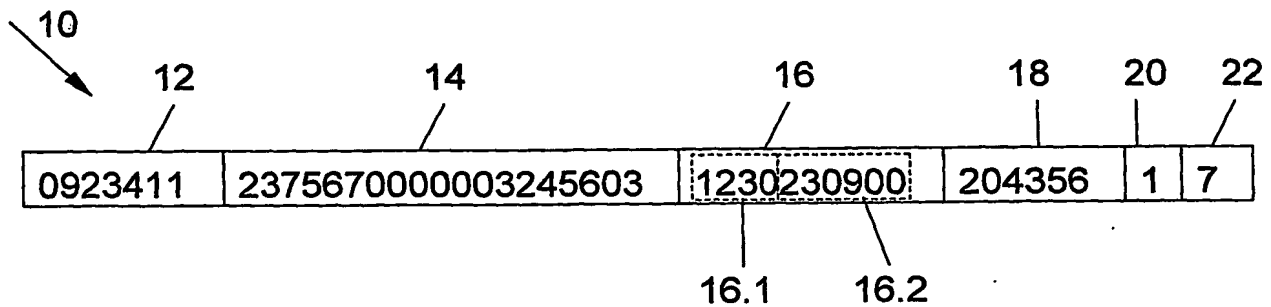


FIG. 2

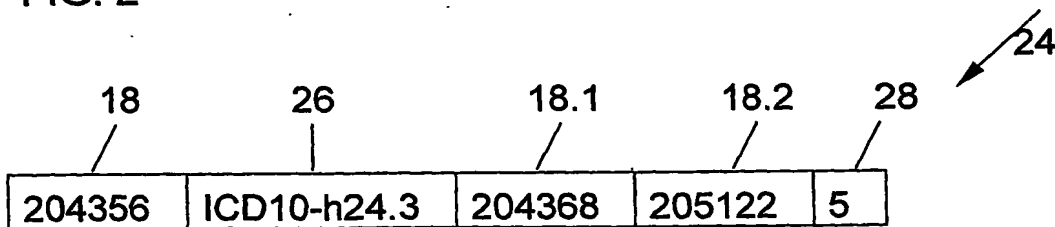


FIG. 3

